

**Amendments to the Claims:**

This listing of claims will replace all prior versions, and listings, of claims in the application:

**Listing of Claims:**

1. (Currently Amended) A circuit arrangement, comprising:

    a low temperature coolant circuit configured to cool charge air in a motor vehicle having a supercharger,

a main coolant circuit in addition to the low temperature coolant circuit, wherein the main coolant circuit is configured to provide coolant to an engine,

wherein the main coolant circuit and the low temperature coolant circuit are connected so that there is an exchange of coolant between the main coolant circuit and the low temperature coolant circuit,

    a single-unit, integrated charge-air and coolant radiator, wherein the low temperature coolant circuit comprises a coolant passage configured to cool the single-unit, integrated charge-air and coolant radiator with coolant flowing through the passage, and

    a temperature sensor provided at a coolant outlet of the radiator, wherein the temperature sensor is located at the coolant outlet prior to any branches in a coolant passage extending from the coolant outlet, wherein the temperature sensor is configured to measure a coolant outlet temperature.

2. (Previously Presented) The circuit arrangement as claimed in claim 1, wherein a coolant flow rate is controlled as a function of the determined coolant temperature.

3. (Previously Presented) The circuit arrangement as claimed in claim 1, wherein the temperature sensor is a thermostat.

4. (Previously Presented) The circuit arrangement as claimed in claim 1, wherein the temperature sensor is integrated into a plastic part which serves to carry coolant.

5. (Previously Presented) The circuit arrangement as claimed in claim 4, wherein the plastic part is produced by means of plastic injection-molding.

6. (Cancelled)

7. (Currently Amended) The circuit arrangement as claimed in claim 1 [[6]], wherein a control valve is arranged in the low temperature coolant circuit.
8. (Previously Presented) The circuit arrangement as claimed in claim 7, wherein the control valve is arranged upstream of a low temperature coolant radiator or upstream of the charge-air and coolant radiator.
9. (Currently Amended) The circuit arrangement as claimed in claim 1, wherein the coolant traveling from the charge-air and coolant ~~charge-air/coolant~~ radiator is fed upstream of a pump to the [[a]] main coolant circuit.
10. (Currently Amended) A method for operating a circuit arrangement, comprising:
  - circulating coolant through a low temperature circuit configured to cool charge air in a motor vehicle having a supercharger,  
circulating coolant for an engine of the motor vehicle through a second circuit,  
wherein the second circuit is provided in addition to the low temperature coolant circuit,  
wherein the second circuit and the low temperature coolant circuit are connected so  
that there is an exchange of coolant between the second circuit and the low temperature  
coolant circuit,
  - providing a single-unit, integrated charge-air and coolant radiator, wherein the coolant circuit comprises a coolant passage configured to cool the single-unit, integrated charge-air and coolant radiator with coolant flowing through the passage,
  - determining the temperature of coolant at an outlet of the radiator, wherein the temperature is determined at the coolant outlet at a location prior to any branches in a coolant passage extending from the coolant outlet, and
  - controlling a coolant flow rate through the radiator.
11. (Previously Presented) The method as claimed in claim 10, wherein the coolant flow rate through the radiator is controlled taking into consideration a rotational speed and/or load.
12. (Previously Presented) The circuit arrangement as claimed in claim 1, wherein the temperature sensor is integrated with the coolant outlet of the radiator.

13. (Cancelled)

14. (Previously Presented) The circuit arrangement as claimed in claim 1, further comprising a low temperature coolant radiator configured to cool coolant supplied to the single-unit, integrated charge-air and coolant radiator.

15. (Previously Presented) The method as claimed in claim 10, wherein the step of determining the temperature of the coolant at the outlet of the radiator is performed by using a sensor integrated with the coolant outlet of the radiator.

16. (Cancelled)

17. (Previously Presented) The method as claimed in claim 10, wherein the step of circulating coolant through the low temperature circuit comprises circulating the coolant through a low temperature coolant radiator configured to cool the coolant supplied to the single-unit, integrated charge-air and coolant radiator.

18. (Previously Presented) The method as claimed in claim 11, wherein the coolant flow rate through the radiator is controlled taking into consideration a rotational speed and/or load of a drive engine of the motor vehicle, a traveling speed of the motor vehicle, an outside temperature and/or an ambient pressure.